

threads of silicifying sarcode all run together into solid fibre, thus enveloping the sexradiate spicule, *c*, in the centre, which is otherwise hollow; *d*, spine or arm of sexradiate increased in size by the silicifying sarcode, but not enveloped in the fibre; *e*, end of vertical arm of sexradiate truncated; *f*, rosette; *g*, bundle of minute hair-like undulating acerates, frequently tricurvate or bow-shaped; *h h*, cylindrical intervals or channels between the trapezoids; *i*, lanteru-like hole, reduced to eight in each trapezoid.

N.B. Although both these figures, viz. 9 and 10, are drawn upon the same scale (viz. 1-24th to 1-1800th inch), it must not be assumed that the trapezoids are as regularly formed throughout the mass; hence they must, to a certain extent, be viewed more or less as diagrammatic.

- Fig. 11.* The same: oblique view of the trapezoid of fig. 9, showing all the arms of the sexradiate spicule *within* the reticulated threads of silicifying sarcode.
Fig. 12. The same: diagram of trapezoid to show the sexradiate cross as it exists in the trapezoid of fig. 10.
Fig. 13. The same: staple form of dermal sexradiate, scale 1-24th to 1-1800th inch.
Fig. 14. The same: rosette, more magnified.
Fig. 15. The same: tricurvates, more magnified.
Fig. 16. The same: large sexradiate spicule of the fringe.
Fig. 17. The same: fragment of large uneven spicule in the fringe.

X.—*List of the Species of Crustacea collected by the Rev. A. E. Eaton at Spitzbergen in the Summer of 1873, with their Localities and Notes.* By EDWARD J. MIERS, F.L.S., F.Z.S., Assistant in the Zoological Department, British Museum.

A SMALL collection of Crustacea, made by the Rev. A. E. Eaton during a voyage with B. Leigh Smith, Esq., to Spitzbergen, in 1873, was presented to the Trustees of the British Museum in the following year. The species are most of them well-known Arctic forms; but the specimens generally are of a large size and in an excellent state of preservation. The value of the collection is further enhanced by the exact locality of nearly every specimen being recorded.

The crustacean fauna of the Scandinavian and adjacent arctic seas appears to have been investigated more thoroughly than that of any other great region of the globe, if we may judge from the amount of literature relating to it; for in the Introduction to his 'Skandinaviske og Arktiske Amphipoder' (Christiania, 4to, 1872), A. Boeck enumerates no less than 273 publications in which animals of this order alone are referred to in connexion with this area.

In 1863 A. v. Goës published a list of the Decapoda inhabiting the region mentioned, with remarks on the geographical

distribution of each of the species (in *Œfvers. Kongl. Vetensk. Akad. Förhandl.* p. 161); in addition to all which are mentioned below, he records many others from Spitzbergen.

The long-known and widely distributed Isopod *Æga psora*, Pennant (*Æga emarginata*, Leach), has not, to my knowledge, been obtained in these seas before.

In 1865 the Spitzbergen Amphipoda were dealt with by A. v. Goës (in *Œfvers. af K. Vet. Akad. Förh.* 1865, pp. 517–536, pls. 6). *Anonyx bidenticulatus*, S. Bate, is the only one in the present collection that is unnoticed by him. Mr. Spence Bate, in the Catalogue of Amphipodous Crustacea in the collection of the British Museum (1862), referred to this species as synonymous with *A. nugax*, Phipps; but a careful comparison of the two forms leads me to differ from him in opinion, and to consider them to be quite distinct from one another*.

The cirriped *Balanus porcatus*, Da Costa, is another addition to our knowledge of the Spitzbergen fauna; and so is one of the two species of Pycnogonida collected, *Nymphon gracile*, Leach.

DECAPODA.

HYAS, Leach.

Hyas araneus.

Cancer araneus, Linn. *Syst. Nat.* (ed. xii.) p. 1044 (1766); Pennant, *Brit. Zool.* iv. p. 6, pl. ix. fig. 16 (1777).

Cancer bufo, Herbst, *Naturg. Krabben u. Krebse*, i. p. 242, pl. xvii. fig. 95 (1790).

Hyas araneus, Leach, *Ed. Encycl.* vii. p. 431 (1814); *Mal. Pod. Brit.* pl. xxi. A. figs. 1–5; Bell, *Brit. Crust.* p. 31 (1853); Goës, *Œfv. Kongl. Vet. Akad. Förh.* p. 161 (1863).

Hyas aranea, M.-Edw. *Hist. Nat. Crust.* i. p. 312 (1834).

Hab. Green Harbour (Ice Fiord), in 30 fathoms (*Walker*).

A single example (an adult male) is in the collection.

EUPAGURUS, Brandt.

Eupagurus pubescens.

Pagurus pubescens, Kröyer, *Kongl. Danske Vidensk. Selsk. 7 Deel*, p. 314 (1838); *Nat. Tidsskr. förse R.* ii. p. 251 (1838–9); *Voy. en Scand.*

* Among the shells collected were some miscellanea not seen by me, which were sent to the Rev. A. M. Norman for examination. Fragments of *Vertumnus serratus*, Fab., and of *Byblis Gaimardi*, Kröyer, were detected by him. Accepting his determinations, I include them in the list and give their synonymy. Their localities were not stated in the letter.

pl. ii. fig. 1; Brandt, Middend. Sibirische Reise, Zool. pt. i. p. 111 (1851); Goës, *Œfv. Kongl. Vet. Akad. Förhandl.* p. 166 (1863).
Eupagurus pubescens, Stimpson, Proc. Ac. Nat. Sci. Phil. p. 237 (1858).

Hab. Green Harbour.

A fine series of specimens, young and adult, is in the collection.

The crustacea and fish from Green Harbour and Magdalena Bay were mostly obtained with a trawl by Captain Walker of Hull, Master of Mr. Leigh Smith's yacht the 'Sampson,' acting as tender to the 'Diana.'

SABINEA, Ross.

Sabinea septemcarinata.

Crangon septemcarinatus, Sabine, Capt. Parry's 1st Voy. Appen. no. x. p. 58, pl. ii. figs. 11–13 (1821); M.-Edw. Hist. Nat. Crust. ii. p. 343 (1837); Goës, *Kongl. Vet. Akad. Förh.* p. 173 (1863).

Sabinea septemcarinata, Owen, Append. Ross's 2nd Voy. Zool. Crust. p. lxxxii (1835).

Sabinea (Crangon) septemcarinata, Kröyer, Nat. Tidsskr. iv. p. 244, pl. iv. figs. 34–40, pl. v. figs. 41–44 (1842–43).

Hab. Green Harbour.

A single specimen is in the collection. Length 3 inches.

CHERAPHILUS, Kinahan.

Cheraphilus boreas.

Cancer boreas, Phipps, Voy. North Pole, p. 190, pl. xii. fig. 1 (1774).

Cancer homaroïdes, O. Fabr. Fauna Grœnlandica, p. 241 (1780); Moïr, Isl. Naturhist. Nr. 245, pl. v. (1786).

Crangon boreas, Fabr. Ent. Syst. Suppl. p. 410 (1798); M.-Edw. Hist. Nat. Crust. ii. p. 342 (1837); Kröyer, Nat. Tidsskr. iv. p. 218, pl. iv. figs. 1–14 (1842–43); Goës, *Œfv. Kongl. Vet. Akad. Förh.* p. 173 (1863); Buchholz, Zweite deutsche Nordpolarf. Zool. Crust. p. 271 (1874).

Cheraphilus boreas, Kinahan, Proc. Royal Irish Acad. viii. p. 68 (1864).

Hab. Green Harbour; Lomme Bay, in 15 fathoms.

A large series of specimens of various ages is in the collection. There is a median longitudinal series of four spines on the carapace, of which the second and third are placed near to one another and are sometimes united. In the adult specimens the lateral ridges are less strongly defined, and the spines upon the carapace and first and second abdominal segments are more obtuse or even obsolete. The largest specimen (a female with ova) has a length, from tip of rostrum to extremity of telson, of nearly 4 inches.

HIPPOLYTE, Leach.

Hippolyte polaris.

Alpheus polaris, Sabine, in Parry's 1st Voy. Append. no. x. p. 60, pl. ii. figs. 5–8 (1821).

Hippolyte polaris, Owen, Append. Ross's 2nd Voy. Zool. Crust. p. lxxxv

(1835); M.-Edw. Hist. Nat. Crust. ii. p. 376 (1837); Kröyer, Monogr. Fremst. Slægt. Hippolyte's nord. Art. p. 116, pl. iii. figs. 78-81, pl. iv. fig. 82 (1842); Goës, Øfv. Kongl. Vet. Akad. Förh. p. 169 (1863).

Hab. Carl Island and Cape Torell, in 12-18 fathoms.

Hippolyte Gaimardii.

Hippolyte Gaimardii, M.-Edw. Hist. Nat. Crust. ii. p. 378 (1837); Kröyer, Monogr. Fremst. Slægt. Hippolyte's nord. Art. p. 74, pl. i. figs. 21-29 (1842).

Hippolyte Gaimardi, Goës, Øfv. Kongl. Vetensk. Akad. Förh. p. 168 (1863).

Hab. Green Harbour.

Hippolyte borealis.

Hippolyte borealis, Owen, Append. Ross's 2nd Voy. Zool. Crust. p. lxxxiv, pl. B. fig. 3 (1835); M.-Edw. Hist. Nat. Crust. ii. p. 372 (1837); Kröyer, Monogr. Fremst. Slægt. Hippolyte's nord. Art. p. 122, pl. iii. figs. 74-77 (1842); Buchholz, Zweite deutsche Nordpolarf. Zool. Crust. p. 276 (1874).

Hab. Carl Island and Cape Torell, in 12-18 fathoms.

In nearly all the specimens that I refer to this species the three or four teeth on the inferior margin of the rostrum are very obscurely defined. In one specimen they are entirely obsolete. The upper margin of the rostrum in this species is always smooth, entire, and unarmed.

ISOPODA.

Æga, Leach.

Æga psora.

Oniscus psora, Pennant, Brit. Zool. iv. pl. xviii. fig. 1 (1777).

Æga emarginata, Leach, Trans. Linn. Soc. xi. p. 370 (1815); M.-Edw. Hist. Nat. Crust. iii. p. 240 (1840); Cuvier, Règne Animal (ed. Crochard), pl. lxxvii. fig. 1.

Æga psora, Spence Bate and Westwood, Brit. Sessile-Eyed Crust. ii. p. 283 (1868).

Hab. Green Harbour.

Two specimens in the collection. Length $1\frac{5}{6}$ inch.

AMPHIPODA.

STEGOCEPHALUS, Kröyer.

Stegocephalus ampulla.

Cancer ampulla, Phipps, Voy. North Pole, Append. p. 191, pl. xii. fig. 3 (1774).

Lysianassa? *ampulla*, M.-Edw. Hist. Nat. Crust. iii. p. 22 (1840).

Stegocephalus ampulla, Spence Bate, Cat. Amphip. Crust. Brit. Mus. p. 63, pl. x. fig. 2 (1862); Goës, *Œfv. Kongl. Vet. Akad. Förh.* p. 521, pl. xxxviii. fig. 9 (1865); Boeck (part), *Forhandl. Vidensk. Selsk.* p. 128 (1870).

Hab. Near Carl Island and Cape Torell, in 12–18 fathoms.

In the single specimen of this species in the collection the rostrum is obtusely pointed and reaches beyond the peduncle of the short superior antennæ. The coxæ of the second pair of pereiopoda have the anterior margin straight, and are produced posteriorly to a distance equalling twice the width of the coxa at its upper margin. The bases of the fifth pair of pereiopoda have the postero-lateral margins rounded. The third segment of the pleon has the posterior margin regularly concave excavate. The colour is dark olive-green, with a small faintly marked white spot on each side of every segment of the body.

Stegocephalus inflatus.

Stegocephalus inflatus, Kröyer, *Nat. Tidsskr. 1 R. iv.* p. 150 (1842–43); 2 R. i. p. 522 (1844–45); *Voy. en Scand.* pl. xx. fig. 6.

Stegocephalus ampulla, Goës, *Œfv. Kongl. Vet. Ak. Förhandl.* p. 521, pl. xxxviii. fig. 8 (1865); Boeck (part), *Forhandl. Vidensk. Selsk.* p. 128 (1870).

Hab. Carl Island and Cape Torell, in 12–18 fathoms.

Several specimens are in the collection. They all have the rostrum acute and shorter than the peduncle of the superior antennæ. Coxæ of the second pair of pereiopoda hatchet-shaped; the anterior margin slightly concave, the postero-lateral lobe acute and produced to a distance not exceeding the width of the coxa at its upper margin. Bases of fifth pair of pereiopoda with the postero-lateral angle acute. Third segment of the pleon with the posterior margin angularly excavate. Colour yellowish white, with transverse series of brown patches on each segment and coxæ.

VERTUMNUS, Boeck.

Vertumnus serratus.

Oniscus serratus, O. Fabr. *Fauna Groenl.* p. 262 (1780).

Amphithoë serra, Kröyer, *Danske Vidensk. Selsk. Afh.* vii. p. 266, pl. ii. fig. 8 (1838); M.-Edw. *Hist. Nat. Crust.* iii. p. 25 (1840).

Acanthonotus serratus, Spence Bate, Cat. Amphip. Crust. Brit. Mus. p. 127 (1862).

Vertumnus serratus, Goës, *Œfv. Kongl. Vet. Akad. Förhandl.* p. 523 (1865); Boeck, *Vidensk. Selsk. Forhandl.* p. 180 (1870).

Hab. Spitzbergen.

ANONYX, Kröyer.

Anonyx nugax.

Cancer nugax, Phipps, *Voy. North Pole, Appendix*, p. 192, pl. xii. fig. 2 (1774).

Lysianassa (Anonyx) lagena, Kröyer, *Danske Vid. Selsk. Nat. Afh.* vii.

p. 237, pl. i. fig. 1, ♀ (1838); M.-Edw. Hist. Nat. Crust. iii. p. 21 (1840); Goës, Œfv. Vet. Ak. Förh. p. 518 (1865).

Lysianassa (Anonyx) appendiculosa, Kröyer, l. c. p. 240, pl. 1. fig. 2, ♂ (1838).

Anonyx ampulla, Kröyer, Nat. Tidsskr. 2 R. i. p. 578 (1844); Voy. en Scand. pl. xiii. fig. 2.

Anonyx (Lysianassa) lagena, Boeck, Skandin. og Arktiske Amphip. p. 152 (1872).

Hab. Green Harbour; Carl Island, Cape Torell, in 12–18 fathoms. Phipps's figure of this common Arctic species is quite recognizable; and his name must therefore be adopted for it.

Anonyx bidenticulatus.

Lysianassa bidenticulata, Spence Bate, Ann. & Mag. Nat. Hist. ser. 3, i. p. 362 (1858).

Lysianassa nugax, Spence Bate, Cat. Amphip. Crust. Brit. Mus. p. 65, pl. x. fig. 3 (1862), nec auctorum.

Hab. Fair Haven, in 4–5 fathoms; Lomme Bay, 15 fathoms.

The specimens which I refer to this species are distinguished by the form of the third segment of the pleon, which has a second tooth on its posterior margin above that of the postero-lateral angle. Boeck, in his 'Skandinaviske og Arktiske Amphipoder,' refers Mr. Spence Bate's figure of *L. nugax* to *Socarnes Vahlii*, Kröyer—wrongly, I think; for in that species the inferior angle of the third segment of the pleon is "valde rotundatus" (see also Kröyer's figure of *S. Vahlii* in the 'Voy. en Scandinavie,' pl. xiv. fig. 1).

ATYLUS, Leach.

Atylus carinatus.

Gammarus carinatus, Fabr. Ent. Syst. ii. p. 515 (1793).

Atylus carinatus, Leach, Zool. Miscell. iii. p. 22, pl. lxix. (1815); M.-Edw. Hist. Nat. Crust. iii. p. 68 (1840); Spence Bate, Cat. Amphip. Crust. Brit. Mus. p. 134, pl. xxv. figs. 1–3 (1862); Boeck, Forhandl. Vidensk. Selsk. p. 190 (1870); Buchholz, Zweite deutsche Nordpolarf. Zool. Crust. p. 357, pl. x. (1874).

Amphithoë carinata, Kröyer, Kongl. Danske Vid. Selsk. 7 Deel p. 256, pl. ii. fig. 6 (1838); Voy. en Scand. pl. xi. fig. 1; M.-Edw. Hist. Nat. Crust. iii. p. 41 (1840).

Paramphithoë carinata, Goës, Œfv. Kongl. Vet. Akad. Förh. p. 523 (1865).

Hab. Lomme Bay, in 15 fathoms.

ACANTHOZONE, Boeck.

Acanthozone hystrix.

Acanthosoma hystrix, Owen, Append. Ross's 2nd Voy. Zool. Crust. p. 91, pl. B. fig. 4 (1835).

Amphithoë hystrix, Kröyer, Kongl. Danske Vid. Selsk. Deel 7, pl. ii. figs. 6 & 7 (1838); M.-Edwards, Hist. Nat. Crust. iii. p. 40 (1840).

Paramphithoë hystrix, Bruzelius, Kongl. Vet. Akad. Handl. iii. p. 71

(1859); Spence Bate, Cat. Amphip. Crust. Brit. Mus. p. 147, pl. xxviii. fig. 1 (1862); Goës, *Œfv. Kong. Vet. Akad. Förh.* p. 525 (1865).

Acanthozone hystrix, Boeck, Forhandl. Vidensk. Selsk. p. 184 (1870).

Hab. Carl Island and Cape Torell, in 12–18 fathoms.

This species has been referred by Boeck to the *Oniscus cuspidatus* of Lepechin (*Acta Acad. Sci. Petrop.* p. 249, pl. viii. fig. 3, 1780); but the species figured by that author differs in having vertically projecting spines upon only the first four segments of the pereion. The species figured by Buchholz (*Zweite deutsche Nordpolarf. Zool. Crust.* p. 362, pl. xi.) as *Acanthozone hystrix* differs from that figured by Owen in the more numerous and closely placed spines upon the posterior margins of the basa of the pereiopoda, and in the form of the rostrum, and is, I think, distinct.

The name *Acanthozone* has been substituted by Boeck for *Acanthosoma*, the latter name being preoccupied in entomology.

TRITROPIS, Boeck.

Tritropis aculeata.

Oniscus aculeatus, Lepechin, *Acta Acad. Sci. Petropolit.* p. 247, pl. viii. fig. 1 (1780).

Talitrus Edwardsii, Sabine, *Capt. Parry's 1st Voy. Append.* no. x. p. 54, pl. ii. figs. 1–4 (1821).

Amphithonotus Edwardsii, Spence Bate, *Cat. Amphip. Crust. Brit. Mus.* p. 151, pl. xxviii. fig. 5 (1862).

Amphithonotus aculeatus, Goës, *Œfv. Vet. Akad. Förh.* p. 526 (1865); Buchholz, *Zweite deutsche Nordpolarf.* p. 316, pl. iv. (1874).

Tritropis aculeata, Boeck, *Forhandl. Vidensk. Selsk.* p. 158 (1870).

Hab. Green Harbour.

BYBLIS, A. Boeck.

Byblis Gaimardi.

Ampelisca Gaimardi, Kröyer, in Gaimard's *Voy. en Scand. Crust.* pl. xxiii. fig. 1; Spence Bate, *Cat. Amphip. Crust. Brit. Mus.* p. 91, pl. xv. fig. 1 (1862); Goës, *Œfv. Kongl. Vet. Akad. Förh.* p. 529 (1865).

Tetromatus typicus, Spence Bate, *Brit. Assoc. Rep.* p. 58 (1855); *Ann. & Mag. Nat. Hist. ser. 2, vol. xix.* p. 139 (1857); White, *Pop. Hist. Brit. Crust.* p. 171, pl. x. fig. 4 (1857).

Byblis Gaimardi, A. Boeck, *Vidensk. Selsk. Forhandl.* p. 228 (1870).

Hab. Spitzbergen.

EUSIRUS, Kröyer.

Eusirus cuspidatus.

Eusirus cuspidatus, Kröyer, *Nat. Tidsskr. 2 R. i. p. 501 (1844–5)*; *Voy. en Scand.* pl. xix. fig. 2; Spence Bate, *Cat. Amphip. Crust. Brit. Mus.* p. 154, pl. xxviii. figs. 6, 7 (1862); Goës, *Œfv. Vet. Akad. Ann. & Mag. N. Hist. Ser. 4. Vol. xix.*

Förh. p. 529 (1865); Buchholz, Zweite deutsche Nordpolarf. Zool. Crust. p. 313, pl. iii. fig. 12 (1874).

Hab. Carl Island and Cape Torell, in 12–18 fathoms.

AMATHILLA, S. Bate and Westwood.

Amathilla Sabini.

Gammarus Sabini, Leach, Append. Ross's 1st Voy. p. 178 (1819); Sabine, Capt. Parry's 1st Voy. Append. p. 54, pl. i. figs. 8–11 (1821); Kröyer, Kongl. Danske Vid. Selsk. Deel 7, p. 244, pl. i. fig. 3 (1838); Goës, (Efsv. Vet. Akad. Förh. p. 531 (1865).

Amathia Sabini, Spence Bate, Cat. Amphip. Crust. Brit. Mus. p. 197, pl. xxxv. fig. 9 (1862).

Amathilla Sabini, Spence Bate & Westwood, Brit. Sessile-Eyed Crust. i. p. 361 (1861); Buchholz, Zweite deutsche Nordpolarf. Zool. Crust. p. 346, pl. viii. figs. 1, 2, and pl. ix. fig. 1 (1874).

Hab. Treurenberg Bay, along the shore.

GAMMARUS, Fabricius.

Gammarus locusta.

Cancer locusta, Linn. Syst. Nat. ed. xii. p. 1055 (1766).

Gammarus locusta, Fabr. Ent. Syst. ii. p. 516 (1793); Leach, Trans. Linn. Soc. xi. p. 359 (1815); M.-Edw. Hist. Nat. Crust. iii. p. 44 (1840); Spence Bate, Cat. Amphip. Crust. Brit. Mus. p. 206, pl. xxxvi. fig. 6 (1862); Goës (part), (Efsv. Kongl. Vet. Akad. Förh. p. 530 (1865); Boeck, Vidensk. Selsk. Förhandl. p. 204 (1870); Buchholz, Zweite deutsche Nordpolarf. Zool. Crust. p. 343 (1874).

Gammarus boreus, Sabine, Capt. Parry's 1st Voy. Append. p. 51 (1821).

Gammarus Duebeni, Lilljeborg, (Efsv. Kongl. Vet. Akad. Förhandl. p. 22 (1851).

Gammarus mutatus, Lilljeborg, Kongl. Vet. Akad. Handl. p. 447 (1853).

Gammarus sitchensis, Brandt, in Middendorff's Sibirische Reise (2nd part), i. p. 133 (1851).

Hab. Magdalena Bay.

THEMISTO, Guérin-Ménéville.

Themisto libellula.

Gammarus libellula, Mandt, Observ. Hist. Nat. in itin. greenland. factæ Diss. p. 22 (1822).

Themisto arctica, Kröyer, Kongl. Danske Vid. Selsk. naturv. Afh. vii. p. 291, pl. iv. fig. 16 (1838); Spence Bate, Cat. Amphip. Crust. Brit. Mus. p. 315, pl. 4. fig. 11 (1862).

Themisto crassicornis, Kröyer, l. c. p. 295, pl. iv. fig. 17 (1838); Spence Bate, l. c. p. 315, pl. 4. fig. 12 (1862).

Themisto libellula, Goës, (Efsv. Vet. Akad. Förh. p. 533 (1865); Boeck, Skandin. og Arktiske Amphip. p. 88, pl. i. fig. 5 (1872).

Hab. Spitzbergen, abundant among the floes and along the shore.

Some of the specimens in the collection were found in a Saddle-back's stomach killed off the Western Ice in green water.

CAPRELLA, Lamarck.

Caprella septentrionalis.

Squilla lobata, O. Fabr. Fauna Grönland. p. 248 (1780), nec Müller.

Caprella septentrionalis, Kröyer, Nat. Tidsskr. 1 R. iv. p. 590, pl. viii. figs. 10-19 (1843); Voy. en Scand. pl. xxv. fig. 2; Spence Bate, Cat. Amphip. Crust. Brit. Mus. p. 355, pl. lvi. fig. 3 (1862); Goës, (Efv. Kongl. Vet. Ak. Förhandl. p. 534 (1865); Boeck, Vidensk. Selsk. Förhandl. p. 276 (1870).

Caprella cercopoides, White, in Sutherland's Journ. Crust. p. 207 (1852).

Hab. Fair Haven, in 4-5 fathoms. Abundant on Algae and Polyzoa. Colour in life reddish brown.

Now and then a moving speck might be seen on the smooth surface of the water from the boat. Sometimes close inspection would enable the cause of the minute disturbance of the sea to be detected in the form of a *Caprella* making strenuous efforts to swim, throwing itself about like a letter S in agonies.

Caprella spinosissima.

Aegina spinosissima, Stimpson, Syn. Invert. Great Manan, p. 44 (1853).

Caprella spinifera, Bell, in Belcher's 'Last of the Arctic Voyages,' ii. p. 407, pl. xxxv. fig. 2 (1855); Goës, (Efv. Vet. Akad. Förhandl. p. 535 (1865); Buchholz, Zweite deutsche Nordpolarf. Zool. Crust. p. 338 (1874).

Aegina echinata, Boeck, Forh. Skand. Nat. p. 670 (1860); Vidensk. Selsk. Forhandl. p. 271 (1870).

Caprella spinosissima, Spence Bate, Cat. Amphip. Crust. Brit. Mus. p. 361, pl. lvii. fig. 3 (1862).

Hab. Carl Island and Cape Torell, in 12-18 fathoms; Lomme Bay, in 15 fathoms.

The spines which cover the body of this species are of very variable length, being sometimes long and acute, sometimes quite small.

CIRRIPEDIA.

BALANUS auctorum.

Balanus porcatus.

Balanus porcatus, Da Costa, Hist. Nat. Test. Brit. p. 249 (1778); Darwin, Monogr. Cirripedia, Balanidae, p. 256, pl. vi. fig. 4 (1854); Buchholz, Zweite deutsche Nordpolarf. Zool. Crust. p. 396 (1874).

Hab. Carl Island, in 18 fathoms; Cape Etker, in 15 fathoms.

Mr. Leigh Smith in a previous voyage also obtained this species a few miles to the westward of the northern extremity of Prince Charles's Foreland.

PYCNOGONIDA.

NYMPHON, Fabricius.

Nymphon gracile.

Nymphum gracile, Leach, Zool. Miscell. i. p. 45, pl. xix. fig. (1814).

Nymphon gracile, Johnston, Mag. Zool. & Bot. i. p. 380, figs. 9, 10 (1837).

Hab. Carl Island and Cape Torell, in 12–15 fathoms.

The colour of the animal is light brown, with very short cinereous hairs, which render it scabrous to the touch ; the legs are banded with very fine longitudinal lines of a deeper brown. The joints of the tarsi are subequal ; the second joint of the palpi is rather longer than the third. This species is evidently very nearly allied to *N. grossipes*, Fabr., as described by Kröyer (Nat. Tidsskr. n. R. i. p. 108, 1844) and figured (Voy. en Scand. pl. xxxvi. fig. 1) ; but in that species the third joint of the palpi is much longer than the second, and the animal is described as glabrous.

Leach's specimens of *N. gracile* in the collection of the British Museum are much smaller and slenderer than the specimens from Spitzbergen ; but the proportional length of the joints is the same, and it is evident that the animal becomes more robust as it increases in age.

Nymphon hirtum.

Nymphon hirtum, Fabr. Ent. Syst. iv. p. 417 (1794) ; Kröyer, Nat. Tidsskr. n. R. i. p. 113 (1844–45) ; Voy. en Scand. Crust. pl. xxxvi. fig. 3.

Hab. Carl Island and Cape Torell, in 12–15 fathoms.

XI.—*Descriptions of new Genera and Species of New-Zealand Coleoptera.—Part IV.* By FRANCIS P. PASCOE, F.L.S. &c.

GYRINIDÆ.

Gyrinus Huttoni.

PARNIDÆ.

Potaminus angusticollis.

CURCULIONIDÆ.

Trachyphloeus irritus.

Nicæana, n. g.

— modesta.

Hyperobius tuberculatus.

Eiratus, n. g.

— parvulus.

Epitimetes, n. g.

— lutosus.

Erymneus, n. g.

— Sharpii.

Erirhinus glottis.

— limbatus.

Dorytomus trilobus.

Neomycta, n. g.

— pulicaris.

Eugnomus Wakefieldii.

— fucus.

Pachyura metallica.

Acalles impexus.

— perpusillus.

Acallopais, n. g.

— rudis.

PEDILIDÆ.

Macratria exilis.